

## Branch Instructions with Decoupled Condition and Address

### ABSTRACT OF THE DISCLOSURE

A processor architecture is provided that supports the  
5 decoupling of parameters typically associated with branch/jump  
instructions. Jump instructions are provided that do not contain an  
explicit destination address and other jump instructions are  
provided that do not contain an explicit test condition. In  
accordance with this invention, the processing system provides a  
10 "default" value to any control element in the processor that is not  
expressly controlled by a particular instruction. In the case of a  
branch or call instruction, the default destination-address provided  
to effect the branch or call is the destination-address provided by  
a prior instruction. Subsequent or alternative branch or call  
15 instructions branch to this same address until the default address  
is set to a different address. In like manner, in most cases, the  
default condition that is used to determine the result of a  
conditional test, such as a conditional branch, call, or return  
instruction, is the last condition specified in a prior instruction.  
20 To further support the above objects of this invention, and others,  
condition-testing can also be effected prior to the execution of  
conditional instructions.